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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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Ulrik Bruhn

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EXAMINER

WILLIAMS, MARK A

ART UNIT

PAPER NUMBER

3674

MAIL DATE

DELIVERY MODE

10/05/2011

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/585,952	BRUHN ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	MARK WILLIAMS	3674	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 13 July 2006.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ An election was made by the applicant in response to a restriction requirement set forth during the interview on \_\_\_\_; the restriction requirement and election have been incorporated into this action.
- 4) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 5) ☒ Claim(s) 1-18 is/are pending in the application.
- 5a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 6) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 7) ☒ Claim(s) 1-18 is/are rejected.
- 8) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 9) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 10) ☐ The specification is objected to by the Examiner.
- 11) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 12) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)            | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | Paper No(s)/Mail Date. ____.                                      |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>1/8/07, 7/13/06</u>   | 6) <input type="checkbox"/> Other: ____.                          |

## **DETAILED ACTION**

### ***Claim Rejections - 35 USC § 112***

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 1-18 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 1, “a contracted relative position”, “a shorter distance”, “an expanded relative position”, and “a shorter distance” have each not been adequately defined in the context of the claimed invention. What particular structural elements constitute such orientation and under what conditions?

In claim 1, “a first position” and “a second position” are not fully understood in the context of the claimed position. First and second positions of what particular element?

In claim 1, in “are allowed to move”, it is unclear what is allowing for this moving in the context of the claim language.

Claim 18 is generally unclear and not fully understood.

112 6<sup>th</sup> Paragraph Issue

In claim 1, the claim limitation “locking means” uses the phrase “means for” or “step for”, but it is modified by some structure, material, or acts recited in the claim (by the word "locking"). It is unclear whether the recited structure, material, or acts are sufficient for performing the claimed function which would preclude application of 35 U.S.C. 112, sixth paragraph.

If applicant wishes to have the claim limitation treated under 35 U.S.C. 112, sixth paragraph, applicant is required to amend the claim so that the phrase “means for” or “step for” is clearly **not** modified by sufficient structure, material, or acts for performing the claimed function.

If applicant does **not** wish to have the claim limitation treated under 35 U.S.C. 112, sixth paragraph, applicant is required to amend the claim so that it will clearly not be a means (or step) plus function limitation (*e.g.*, deleting the phrase “means for” or “step for”).

***Claim Rejections - 35 USC § 102***

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 1-18 rejected under 35 U.S.C. 102(b) as being anticipated by Zhao et al., US Patent 6,668,688. A distance piece 10 comprising first and second parts having inner surfaces facing towards each other, and outer surfaces forming part of an outer surface of the distance piece, the parts being movable relative to each other between a contracted relative position with a shorter distance between the outer surfaces and an expanded relative position with a larger distance between the outer surfaces, a separation part (12, 14, 33, 70, 300) located between the first and second parts, and being movable in a first direction between a first position relative to the first and second parts wherein the separation part forces the first and second parts towards the expanded relative position and a second position relative to the first and second parts wherein the first and second parts are allowed to move to the contracted relative position, and locking means (at least the friction between the screw threads) for hindering movement of the separation part from the first position to the second position relative to the first and second parts, wherein the locking means comprises at least one configuration in which it permits movement of the separation part from the second position to the first position relative to the first and second parts. The locking means comprises what is broadly and functionally considered a lock which is movable between a locked position

wherein it hinders the movement of the separation part relative to the first and second parts and an unlocked position wherein it does not influence the movement of the separation part relative to the first and second parts. The lock forms part of the separation part. The separation part comprises a handle 300 extending outside the space to effectuate the movement of the separation part from outside the space. The lock is broadly and functionally considered to form part of the handle to enable movement of the lock between the first and second position from outside the space. The first and second parts are connected by an elastically deformable connection member near 21 exerting on the first and second parts a force towards the contracted relative position. At least one of the inner surfaces comprises a suspension groove at 21 forming a suspension for the separation part. The lock comprises a locking surface portion of at least one of the first and second parts engaging a locking surface portion of the separation part. At least one of the locking surface portions comprises at least one protrusion (theards). The at least one protrusion forms part of an indented surface. The locking surface portion of the first and/or second part is located in a groove in the inner surface of that part. The groove forms an extension of the suspension groove. The separation part in addition to the locking surface portion comprises an unlocking surface portion being smooth relative to the locking surface portion. The locking surface portion

of the separation part is in contact with the locking surface portion of the first and/or the second part in the locked position of the lock, and wherein the unlocking surface portion of the separation part is in contact with the locking surface portion of the first and/or the second part in the unlocked position of the lock. The locking surface portion of the separation part is adapted to rotate relative to the first and second parts between the locked position and the unlocked position. At least one of the first part, the second part and the separation part is wedge shaped (at least at 14). The outer surface of at least one of the first and second parts comprises at least one resilient protrusion. The resilient protrusion is located in a cavity of the surface. As best understood, the locking means comprises is broadly considered to have surface portions of the first and second parts which abut cooperating surface portions of the separation part, wherein the abutting surface portions form an angle, with the first direction, and wherein a coefficient of friction,  $\mu$ , between abutting surfaces multiplied with sine to the angle  $\alpha$  is larger than cosine to the angle.

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to MARK WILLIAMS whose telephone number

is (571)272-7064. The examiner can normally be reached on Monday through Friday. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Thomas Beach can be reached on (571) 272-6988. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Mark A. Williams/  
Examiner, Art Unit 3674

/Carlos Lugo/  
Primary Examiner, Art Unit 3674